52, or 30 per cent. of the cases, the pain was caused by calculi in the kidney or ureter. In 18 cases renal tuberculosis was the cause of the pain while 32 patients had gross suppurative lesions of the kidney. This leaves 68 patients with renal pain but without any gross infection, in whom the nature of the lesion was not immediately apparent, but in the vast majority of these cases the pain was ultimately found to be due to some form of ureteral obstruction, most commonly a stricture of the ureter. Harris believes that the diagnosis can and should be made in the early stages of the disease by means of the cystoscope and the ureteral catheter, or even using pyelography if necessary, because if the diagnosis is made early in the disease, we can expect to cure the patient without sacrificing the kidney. Movable kidneys, on the other hand. should not be subjected to operation unless their causal connection with the existing pain can be unequivocally established. This is a very important statement as it has been proved many times that renal pain is seldom caused by mobility of the kidney and in many cases more harm than good is done by operative fixation of such kidneys.

Frequency of Adenomyoma Uteri.—Since the publication of the excellent monographs on the subject of adenomyoma of the uterus by Cullen, but few articles have been contributed to the literature. In view of the fact that his report contained only 73 (5.7 per cent.) adenomyomas in 1283 myomas of the uterus and since these figures had not been confirmed by an equally large series, it seemed opportune to MacCarty and Blackman (Ann. Surg., 1919, lxix, 135) to add a report from the Mayo Clinic. Between 1906 and 1918, 3388 fibromyomatous uteri were removed in the clinic and of these 211 (6.43 per cent.) contained adenomyomas. In 5 cases the tumor was in the Fallopian tubes. The frequency is somewhat greater in this series than in that of Cullen, but the figures are so close that from 5 to 7 per cent. expresses it safely. The last 109 cases of the series were studied with reference to certain clinical features which might be intimately associated with the condition. Ninety-five patients were married: 41 per cent. gave histories of having had miscarriages, 50 per cent. suffered from profuse and prolonged uterine bleeding, and 31 per cent. from irregular bleeding. In 5.5 per cent. of the cases, epithelioma of the cervix or carcinoma of the body of the uterus was associated, neither of which conditions bore any apparent relationship to the adenomyomas. In 72 per cent, other pathologic pelvic conditions were associated, such as ovarian cysts, chronic or acute salpingitis, uterine or cervical polypi, cystic cervicitis or prolapsus uteri. In no case without the association of a malignant condition was the clinical diagnosis one of malignancy and in no case was a positive diagnosis of adenomyoma made previous to operation, but the clinical diagnosis was clothed in such terms as fibromyoma or pelvic tumor. both of which diagnoses show recognition of definite pathologic conditions of a neoplastic nature without attempting to specify in terms of detailed pathology.

Operation for the Production of Sterility.—It is occasionally important to sterilize a woman without removal of any of the organs and it has been found by experience that simple tying, section or even exsection is inadequate, as the lumen of the tube readily becomes reëstablished.

The procedure recommended by Cupler (Surg., Gynec. and Obst., 1919, xxviii, 317) has been successfully used by him during the past ten years and he has had occasion to observe the result of the operation several years after it was performed but he has never seen any attempt toward restoration of the lumen of the tube, so that he believes that it will secure sterility in 100 per cent. of the cases. In brief, the operation consists of placing a catgut ligature around a small area in the broad ligament including the bloodvessels supplying a limited part of the tube. The tube is then divided and a peritoneal cuff on the proximal end is turned back, the denuded muscle and mucosa of the tube are crushed in the bite of an angiotribe and a catgut ligature is applied in the crease, and the cuff rolled over the stump and ligated. The distal end of the tube is ligated and both ends approximated and the rent in the broad ligament closed. The opposite tube is treated in the same manner and the abdomen is closed.

Carcinoma in a Very Young Woman.—To those who believe that cancer of the cervix only occurs in middle-aged women, the following case which has been reported by STEIN (Am. Jour. Obst., 1919, lxxix, 413) will be of interest. A young woman, aged twenty years, who had had two children and one miscarriage, complained of bleeding profusely and constantly. Four weeks previously she had been curetted by another physician and her condition was diagnosed as uterine polyp. Upon introducing a speculum into the vagina a large irregular, cauliflowershaped mass originating in cervical tissue was found, which was extremely soft and bled upon the slightest touch. With much difficulty the uterus and adnexa were removed, but the involved iliac glands were left behind as the condition of the patient did not warrant the prolongation of the operation which would have been necessary to remove them. When the specimen was opened, it was found that the carcinomatous growth was about the size of a child's fist, originating in the anterior cervical canal and had practically destroyed the whole anterior lip. Microscopic examination showed a papillary zone of acini of polyhedral epithelial cells which are invading the surrounding tissue in all directions. In these cells mitotic figures are common, as are areas of necrosis and hemorrhage, and altogether the picture was one that unquestionably was carcinoma.

## DISEASES OF THE LARYNX AND CONTIGUOUS STRUCTURES

UNDER THE CHARGE OF J. SOLIS-COHEN, M.D., PHILADELPHIA.

A New Technic for Irrigating the Maxillary Antrum through the Inferior Meatus.—Luc (Rev. de Laryn., d'Otol. et de Rhin., May 15, 1918), having witnessed a fatal case of hemorrhage following the usual